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GREEN CROSS

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# Perceived Resistance to Experiences of Trauma and Crisis: A Study Comparing Multiple Life Events

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Subjective perception is considered a key element in the prediction of resistant or vulnerable responses to trauma and crisis. This study aimed to assess the relationship between perceived physical life threat and perceived life impact with posttraumatic stress disorder symptomatology in a sample of 3.565 persons from 12 countries across 9 different traumatic events. Participants were classified into 4 groups of self-perceived resistance based on their levels of perceived physical life threat and perceived life impact. Main results show that Nonaffected was the most frequent category in natural catastrophes (48.9%), migration (45.9%), motor vehicle accidents (39.83%), and death threats (33.4%). In the case of sexual abuse by a relative or close person (44.5%), sexual abuse by a stranger (33.9%), and having a severe, chronic, or disabling illness (47.3%), the most frequent category was Survivor. For domestic violence, the most frequent category was Vulnerable (45.5%). Resistant was never the most frequent category for any of the events studied. Although gender and lower education predicted posttraumatic stress disorder in most events of trauma and crisis, they were a weak predictor of vulnerable versus resistance categories. These results suggest that the perceived resistance indicator can provide insights into the narratives of resistance or vulnerability associated with extreme experiences.

Keywords: VIVO Questionnaire, Perceived resistance, worldviews, trauma, life crisis

It is well known that the majority of the population has experienced one or more extreme experiences throughout their life (Atwoli et al., 2015; Kilpatrick et al., 2013). Available data also show that the vast majority of people usually develops a resilient response (2011; Bonanno et al., 2002), although this changes with the different types of traumatic experiences (Breslau et al., 1998). The European study of the Epidemiology of Mental Disorders showed that 51.8% of women and 48.2% of men had been exposed to at least one severe traumatic experience in their lifetimes. In comparison, only 1.7% of women and 0.5% of men developed posttraumatic stress disorder (PTSD) as a consequence (Alonso et al., 2004; Darves-Bornoz et al., 2008). Other studies confirm similar results in western contexts (Atwoli et al., 2015; Cox et al., 2014).

Previous research studies on resistance to stress suggested that cognitive and personal factors (hardiness, salutogenesis and others) were more relevant in the prediction of trauma response than the stressor (Antonovsky, 1979; Kobasa et al., 1981). Contemporary trauma theory has confirmed that the impact of traumatic experiences differs depending on the type of experience (Keshet et al., 2019; National Collaborating Centre for Mental Health, 2005; Nordstrand et al., 2019). Also there seems to be a relationship between the severity of the threat and the psychological consequences derived from the experience (Bryant et al., 2020; Lanius et al., 2017; Tran & Beck, 2019).

Nevertheless, there is also an increasing body of evidence suggesting that the subjective perception of vital impact of an event is a critical element in understanding the response to trauma and, for some authors, this subjective perception has a more significant impact than the particular characteristics of these events (Ozer et al., 2003; Weathers & Keane, 2007). For instance, when distinguishing

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between life threat and subjective perception of life threat, there is evidence that the second is a better predictor of posttrauma consequences among people surviving disasters (Havenaar et al., 2003); violent assaults (Johansen et al., 2006); terrorist attacks (Heir et al., 2016); sexual abuse (Klump, 2006; Ullman et al., 2007); and motor vehicle accidents (Ehlers et al., 1998; Schnyder et al., 2001).

The subjective perception of experience will be determined, in turn, by multiple psychosocial elements, especially by the emotions experienced at the time when the trauma occurred and the social environment in which the person processed the event. Indeed, it has been observed that the experiences of indignity or humiliation, even in the absence of life threat, may be decisive in the development of posttraumatic symptoms in survivors of political repression and tor-ture (Lee et al., 2001; Saraiya & Lopez-Castro, 2016); homelessness (Fazel et al., 2008) and victims of sexual violence (Frazier, 2003). Among people displaced by political violence or disasters, loss of sense of control over their future and overcrowding in refugee camps for long periods, leading to depersonalisation or lack of privacy, were better predictors of posttraumatic symptoms than the severity of the threat to life (Silove et al., 2007; Vázquez et al., 2005).

Both perspectives, one focused on the characteristics of the event, and another focused on individual subjectivity, have strong arguments to their credit. The question is how they interact. Large population-based studies have shown, for instance, that sexual abuse, when compared with traffic accidents, increases by five times the risk of suffering posttraumatic stress consequences (National Collaborating Centre for Mental Health, 2005). However, it is also clear that, while people surviving minor traffic accidents can survive without major lifelong psychological scars, people who have suffered chronic sexual abuse can develop resilient responses. Therefore, there is an interaction between the characteristics of the event and the subjective perception of the person, which has to date not been possible to capture due to the lack of large population-based studies that include both variables and multiple types of potentially traumatic events.

This study aims to be an initial step in this direction. It considers that a specific person may be resistant to a particular event and vulnerable to another. We do not attempt to define the characteristics of resistant or vulnerable people individually, but rather to identify some of the specific characteristics of the interaction between the person and the environment that foster a resilient response (Bonanno et al., 2011; Turner & Cox, 2004). On this basis, it will be possible to define different response profiles for each of the different types of events. Also, available findings suggest that this kind of response will also vary according to gender (Christiansen & Hansen, 2015; Olff, 2017; Tolin & Foa, 2006); age (Maercker et al., 2004) and educational level and increase with accumulative trauma (Kira, 2019; Shalev et al., 2019).

We believe that this new perspective can capture some of the richness in the interaction between objective and subjective characteristics of situations in which severe trauma and life crisis have occurred, and can help explain the responses of vulnerability or resistance to trauma.

## Method

## Procedure

The VIVO project (Ontological Vital Impact Assessment, VIVO by its initials in Spanish) is an international collaborative study on the impact of experiences of trauma, crisis and loss in human identity and worldviews. The project is based in a network of public health hospitals in Madrid (Spain) and led by the Community Action group (GAC), an organization created in 1997 linked to the field of psychosocial and community work, mental health, and human rights.

The VIVO questionnaire was developed as a tool to assess the impact of extreme experiences in the worldviews, identity and basic beliefs on both general population and survivors. For its validation, the VIVO questionnaire was distributed through the project website (http://www.psicosocial.info) and systematically publicized in more than 1.400 Internet sites randomly selected from general population social forums, major social networks, and distribution lists in Span-ish-speaking countries. Also, there was a permanent link on the website of the CAG research area (http://www.psychosocial.info/) that referred directly to the questionnaire where the public, in general, could answer the questionnaire and receive feedback on the results. Procedures for recruitment and the overall context of the project have been described in detail elsewhere (Pérez-Sales et al., 2012).

## **Participants**

A total of 3.565 participants took part in this study (Figure 1). The sample was obtained from 12 countries, mainly from Spain (32.2%), Argentina (18.2%), Mexico (11.5%), Chile (10.1%), Colombia (9.7%), Venezuela (2.9%), and Peru (2.8%). The mean age was 28 years (SD = 9.74), and 49.1% were women. Young people (between 16 to 25 years) represented 49.2% of the sample, and 50.8% were adults (between 26 and 65 years). The majority were single (65.6%), had a secondary education level or higher (65%), and described themselves as middle class (62.2%). Regarding ideology, 34.5% perceived themselves as left-wing, and 20.9% considered themselves of right-wing ideology. Also, while 57.5% did not practice any religion, from those who described themselves as religious, most were catholic (32%).

## Definitions

A traumatic experience is defined as an event that constitutes a threat to the physical or psychological integrity of the person, often associated with confusing emotions that are usually unspeakable and often perceived as incomprehensible to others. It may potentially question the survivors' identity or one or more underlying assumptions of their human worldviews, particularly their sense of security, and it may involve a questioning of the sense of life and world (Pérez-Sales et al., 2012). In this comprehensive definition of the concept of traumatic event, are included experiences such as a traffic accident, a natural disaster, death, assault or beating threats, domestic violence and sexual abuse. We have also included experiences of crises (such as divorce or separation, migration, or suffering a severe or chronic disease). Although they are usually are not included under the definition of trauma, but that also involves a component of physical threat and a challenge to the person's identity and human worldviews.

## Instruments

• PTSD Checklist–Civilian Version a 17-item scale that assesses the presence of symptoms of posttraumatic stress disorder (Weathers et al., 1991) using *Diagnostic and* 



Statistical Manual of Mental Disorders, Fourth Edition (DSM–IV) criteria using a 5-point scale ranging from 1 (not at all) to 5 (extremely).

The Inventory of Extreme Experiences (Pérez-Sales et al., 2012), part of the VIVO toolbox, collects data on 24 experiences linked to trauma, crisis or loss, including data on the severity of the traumatic experience measured by two variables: (a) perception of physical life threat (PT), ranked from (1) low to (4) extreme, and b) Perception of life Impact (PI), also in four levels (1) "I do not consider myself affected," (2) "I was affected in the past but not now," (3) "There are aspects that still strongly affect me," and (4) "This experience has decisively changed my way of seeing life." For this study, we included nine experiences that were directly related to the perception of life threat: (1) road traffic accidents; (2) natural catastrophes; (3) death, assault or beating threats, and domestic violence; (4) sexual abuse by a stranger; (5) sexual abuse by a family member; (6) severe, chronic or disabling disease; (7) divorce or separation; and (8) migration for economic reasons.

Two measures were derived from these data:

- The Average Score of Traumatic Events (ASTE) is an overall measure that combines the number of events and severity in an indicator to assess the influence of the accumulation of extreme experiences in the response that people have to them. Algorithms for calculations sent on request.
- Self-Perceived Resistance (SPR) is an indicator based on the interaction of PT and PI variables, with four categories: Resistant, Survivor, Vulnerable and Nonaffected (see Figure 2). When a person had a high perception of physical threat toward a traumatic experience (high PT) but did

not consider that this experience had a significant impact on their life (low PI), we suggest that this person perceives himself or herself as Resistant to such experience. However, if this person also considers that the event had a high impact on their lives (high PI), he or she could have a Survivor perception of himself or herself. If a person had a low perception of physical threat (low PT) and a perception of high impact on their life (high PI), this person is deemed to be Vulnerable to that traumatic event. Finally, if both threat and perception of impact are reported as low (low PI), the person is considered as Nonaffected by the experience.

## **Statistical Analysis**

We performed descriptive statistics for each extreme experience. Linear regression analyses were also performed for each life event with those variables whose correlation with PTSD proved to be significant in bivariate analysis. We used PTSD as the dependent variable and the Average Score of Traumatic Events (ASTE), Perception of Life Threat (PT), and Perception of Life Impact (PI) as independent variables. Gender, age, and educational level were introduced as potentially confounding variables by using cross tables and chi-squared test. The alpha risk assumed was 5% for all calculations. All analyses were performed using SPSS 23 for Windows.

## Ethical Elements

Written informed consent was collected for each participant. Data of respondents and results were stored in separate databases, stored in the premises of the Complutense University, and submitted to approval by the Spanish Data Protection Office (RegNum

Figure 2 Perceived Resistance Indicator

		Perception of phys (PT	ical life Threat )
		Low / Medium	Severe / Extreme
Perception of life	<ol> <li>I do not consider myself affected</li> <li>I was affected at the time but not anymore</li> </ol>	Non-affected	Resistant
Impact (PI)	<ul> <li>(3) There are aspects that still strongly affect me</li> <li>(4) The experience has decisively changed my way of viewing life</li> </ul>	Vulnerable	Survivor

56325). The protocol was approved by the IRB of University Hospital La Paz (34/765/2017).

#### Results

The most common events reported in the sample (see Table 1) were divorce (35%), threats of death, assault or beating (34.4%), motor vehicle accidents (27.6%). The less common ones were sexual abuse by a relative or a close person (6.5%) and by a stranger (5.1%).

The experiences in which a higher proportion of respondents report long-lasting consequences (Table 1; PI, Column 3) are domestic violence (46.2%), sexual abuse by a family member or a close person (39.5%), and sexual abuse by a stranger (35.3%). The experiences that more frequently changed the way that respondents understand life challenging human worldviews (Table 1; PI, Column 4) were severe, chronic or disabling illness (43.4%), sexual abuse by a relative or a close person (33.8%), domestic violence (30.4%), sexual abuse by a stranger (29.4%) and migration (29.2%). By contrast, the events in which people declared in a higher proportion to be affected at the time of the events but not anymore (Table 1, PI, Column 1) were natural catastrophes (51.4%), motor vehicle accidents (47.2%) and threats of death or assault (42.3%).

## Perception of Life Threat, Perception of Impact and Post-Traumatic Related Symptoms

We performed Spearman correlations to screen which variables correlated significantly with PTSD. Only those that were statistically significant were included in the regression analyses (Table 2). Age was excluded in all regression models ( $\rho = -.0008$ ; ns). Perception of Life Threat (PT;  $\rho = .17$ ; ns) was excluded for motor vehicle accidents. Linear regressions analysis (Table 2) show that Perception of Life Threat (PT) only predicted PTSD in death threats ( $\beta = .07$ ; p < .05), domestic violence ( $\beta = .13$ ; p < .01), severe, chronic or disabling illness ( $\beta = .12$ ; p < .01), divorce ( $\beta = .2$ ; p < .001) and migration ( $\beta = .16$ ; p < .001). The PT does not predict PTSD in natural disasters ( $\beta = .1$ ; ns), sexual abuse by strangers ( $\beta = .04$ ; ns) and sexual abuse by a relative ( $\beta = .08$ ; ns). The PI predicts PTSD for all events of trauma and loss except for migration ( $\beta = .08$ ; ns).

The Average Score of Traumatic Events (ASTE), as a measure of the overall weight of traumatic events, predicts PTSD-related symptoms for motor vehicle accidents ( $\beta = .11$ ; p < .01); natural disasters ( $\beta = .15$ ; p < .05); serious, chronic and disabling disease ( $\beta = .16$ ; p < .001); and divorce or separation ( $\beta = .11$ ; p < .01).

Gender was a predictor of PTSD in migration ( $\beta = -.22$ ; p < .001), death, assault or beating threats ( $\beta = -.12$ ; p < .001) and

## Table 1

Perception of Three	at and Perception	of Life Impact fo	r Each Experience
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	Prevalence		Perceived	threat (%)		Perceived impact (%)			
Extreme experience	general sample (N, %)	L.	М.	S.	E.	(1)	(2)	(3)	(4)
Road traffic accidents	983, 27.6	4.0	51.8	34.1	10.1	18.3	47.2	24.6	9.9
Natural catastrophe	415, 11.6	2.0	59.1	29.4	9.4	19.7	51.4	18.0	10.9
Death, assault or beating threats	1225, 34.4	4.8	52.1	34.7	8.3	7.5	42.3	32.7	17.5
Domestic violence	704, 19.7	11.6	52.0	31.2	5.2	0.7	22.6	46.2	30.4
Sexual abuse by a stranger	181, 5.1	26.5	28.3	35.5	9.6	12.9	22.4	35.3	29.4
Sexual abuse by relative or a close person	231, 6.5	21.6	27.9	30.6	19.8	7.0	19.7	39.5	33.8
Serious, chronic, or disabling disease	728, 20.4	6.2	35.6	40.1	17.9	4.5	18.6	33.3	43.4
Divorce or separation	1247, 35.0	25.3	39.3	28.2	7.2	6.5	33.4	34.3	25.8
Migration for economic reasons	480, 13.2	39.7	39.0	15.0	6.3	22.4	25.7	22.7	29.2

*Note.* 1 = I do not consider myself affected; 2 = I was affected at the time but not anymore; 3 = There are aspects that still strongly affect me; 4 = The experience decisively changed my way of viewing life. L = low; M = moderate; S = severe; E = extreme.

Summarv	of Li	inear Re	egression A	Analyses	for	Variables	Correlated	With	Posttraumatic	Stress	Disorder
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Event	Variables included	В	SE B	β	Model	Variables excluded	ρ Spearman
Road traffic accident							
	PI	3.21	.74	.18***	$R^2 = 0.09 F = 13.12^{***}$	PT	008
	Gender	-5.34	1.39	$17^{***}$		Age	.17
	ASTE	.54	.2	.11**			
	Ed.	-2.83	1.32	09*			
Natural disaster							
	PI	4.77	1.16	.28***	$R^2 = 0.14 F = 6.27^{***}$	Age	.17
	ASTE	.61	.26	.15*			
	Gender	-3.92	2.17	12			
	Ed.	-3.69	2.3	1			
	PT	2.35	1.61	.1			
Death, assault or beating threats					2		
	PI	4.73	.69	.27***	$R^2 = .14 F = 20.69^{***}$	Age	.17
	Ed.	-3.85	1.12	13***			
	Gender	3.82	1.2	12**			
	PT	1.64	.81	.07*			
	ASTE	.29	.16	.06			
Domestic violence							
	PI	4.77	1.07	.22***	$R^2 = .09 F = 8.35^{***}$	Age	.17
	PT	2.68	.97	.13**			
	Ed.	-3.05	1.42	1*			
	ASTE	.34	.2	.85			
	Gender	1.1	1.62	.03			
Sexual abuse by a stranger					-2		
	Ed.	-7.12	2.65	27**	$R^2 = .14 F = 3.1*$	Age	.17
	PI	4.27	1.85	.27*			
	Gender	79	3.31	02			
	ASTE	.58	.46	.12			
~	PT	.76	1.84	.04			
Sexual abuse by a relative or a close	57	2 10		24.1			15
person	PI	3.49	1.57	.21*	$R^2 = .12 F = 3.55^{**}$	Age	.17
	Ed.	-6	2.41	2*			
	PT	1.21	1.3	.08			
	Gender	-2.27	3.11	06			
0 1 1 11 11 11	ASTE	07	.32	02			
Severe, chronic or disabling illness	DI	2.02	07	1/444	$P^2$ 1 E 10.00***		17
	PI	2.93	.8/	.16***	$R^2 = .1 F = 10.02^{***}$	Age	.17
	ASTE	.69	.19	.165***			
	Ed.	-3.55	1.35	12**			
	PT	2.36	.9	.12**			
D'	Gender	-2.72	1.48	08			
Divorce or separation	DT	2.22	74	0***	$\mathbf{p}^2$ 14 E 10.0(***		17
	PI	3.33	./4	.2***	$R^2 = .14 F = 19.06^{+++}$	Age	.17
	PI	2.79	./4	.10***			
	ASIE	.48	.10	.11**			
	Ed.	-3.31	1.11	11**			
Migration by aconomic reasons	Gender	-2.8	1.19	09**			
wigration by economic reasons	Condon	7 77	2.07	22***	$P^2 = 0.16 E = 9.22 * * *$	A ~~	
	DT	-1.57	2.07	22****	$K = 0.10 F = 0.52^{+0.00}$	Age	
	FI Ed	2.94	1.4	10**			
	EU.	-3.41 41	1.//	19***			
	ASIE	.41	.20	.09			
	F1	1.23	1.11	.00			

*Note.* PT = perception of life threat; PI = perception of life impact; ASTE = Average Score of Traumatic Events; Ed = Education. \* p < .05. \*\* p < .01. \*\*\* p < .001.

motor vehicle accidents ( $\beta = -.17$ ; p < .001). Level of education was also a predictor in most of the experiences except for natural disasters ( $\beta = -.1$ ; ns).

## Self-Perceived Resistance in Extreme Events

The unit of analysis is events.

Figure 3 compares each extreme event for every category of perceived resistance (Nonaffected, Survivor, Resistant and Vulnerable). In the case of natural catastrophes (48.9%), migration (45.9%), motor vehicle accidents (39.83%), and death threats (33.4%), most participants were Nonaffected. Concerning sexual abuse by a relative or close person (44.5%), sexual abuse by a stranger (33.9%), and having a severe, chronic, or disabling



## Figure 3

Percentages for Each Self-Perceived Resistance Category in All Extreme Experiences

illness (47.3%), most respondents were Survivors. In the case of domestic violence, the most frequent category was Vulnerable (45.5%). Resistant was never the most frequent category for any of the events.

Table 3 compares self-perceived resistance by gender and educational level, the only two variables that showed positive correlations in bivariate analysis. In overall there are more women than men in the Vulnerable and Survivors categories in Motor vehicle accidents ( $\chi^2 = 35.3$ , p < .001), Natural disasters ( $\chi^2 =$ 25.1, p < .001) and Death assault ( $\chi^2 = 97.9, p < .001$ ). Those are the categories associated with the most significant subjective impact as compared to the actual perception of threat. Unexpectedly, there are no differences by gender in Domestic Violence  $(\chi^2 = 3.6, \text{ ns})$ , Sexual assault by a stranger  $(\chi^2 = .1, \text{ ns})$  and Sexual assault by a relative ( $\chi^2 = 6.6$ , ns), suggesting that they are experiences linked to a high perception of threat and impact for both genders. Regarding crisis, there are no differences by gender in Divorce of Separation, ( $\chi^2 = 3.8$ , ns), Migration ( $\chi^2 = 5.4$ , ns) and there are more survivors and vulnerable among women in Serious, chronic or disabling disease ( $\chi^2 = 13.4$ , p < .001). Although there is a tendency to have more Survivors and Vulnerable population among the lower educated groups, this only reaches statistical significance in Natural Disasters ( $\chi^2 = 15.1$ , p < .001).

Table 4 shows the ANOVA analysis of PTSD scores by the experience of trauma, crisis and loss and self-perceived resistance. For most trauma events Survivors and Vulnerable population score higher than Resistant and Non-Affected (Motor vehicle accidents F = 8.4, p < .001, Natural disasters F = 7.2, p < .001, Death assault F = 28.9, p < .001, Domestic Violence F = 10.7, p < .001). This confirms the idea that it is the subjective perception of impact and not the actual threat what determines

PTSD scores. There are two notable exceptions. Sexual assault by a stranger (F = 1.4, ns), and Sexual assault by a relative or close friend (F = 2.6, ns) where PTSD scores are similar for all categories of self-perceived resistance. This suggests that Sexual assault is a distinct category of traumatic events where there is a traumatic impact irrespective of whether the person perceives him or herself as vulnerable or resistant. Resistant people also score high in PTSD, meaning that resilience is a narrative related to what the person tells to him or herself, and it does not necessarily mean less posttraumatic symptoms. Finally, for all crisis events, Survivors score higher than all other groups (Serious, Chronic or disabling illness F = 9.5, p < .001, Divorce or separation F = 26.8, p < .001, Migration F = 3.9, p < .001) suggesting that crisis are associated with PTSD only when there is a high perception of threat.

## Discussion

Our data offer a unique epidemiological perspective on the different profiles of resistance and vulnerability answers in experiences of trauma and crisis (see Table 1). In an international Spanish-Speaking sample, survivors of domestic violence, sexual abuse by a stranger and by relative or a close person, and divorce or separation (interpersonal experiences) have a higher perception of life impact than survivors of natural disasters or motor vehicle accidents (noninterpersonal traumatic events). The only exception is a severe, chronic, or disabling illness. Overall, our findings confirm that experiences of interpersonal violence are associated with a higher impact on worldviews (Breslau et al., 2004; Chapman et al., 2012). These are experiences that confront the person with his or her vision of others and connect with experiences of intimacy, trust and care (Botsford et al., 2019);

Table 3		
Chi-Square of Self-Perceived Resistance	ce by Gender and Educational L	ovol

		Gender (%)			Edu	acational Leve	el (%)	
Experience	SPR	Women	Men	$X^2$ (df)	Upper	Middle	Primary	$X^2(df)$
Motor vehicle accident	S	21.2	16.5	35.3 (3)***	19.7	15.6	25.8	4.34 (6)
	VB	22.8	10.7		16.2	17.5	9.7	
	R	20.4	29.6		23.9	28	25.8	
	NAF	35.6	43.2	40.2	38.9	38.7		
Natural disaster	S	18.7	15.2	25.1 (3)***	18.3	8.7	30	15.16 (6)*
	VB	21.1	6.3		9.8	43.5	30	
	R	14.5	27.2		21	27.5	20	
	NAF	45.8	51.3	43.5	20.3	20		
Death, assault or beating threats	S	36.5	18.6	97.9 (3)***	27.8	23.5	28.1	3.92 (6)
, 6	VB	28.8	18.6	~ /	21.9	25.4	27.8	
	R	9.6	22.1		16.4	16.6	11.1	
	NAF	25.1	40.8	33.6	34.5	33.3		
Domestic Violence	S	30.3	34.5	3.6 (3)	30.8	27.9	54.2	8.95 (6)
	VB	46.9	42.7	~ /	45.7	41.7	41.7	~ /
	R	4	6.4		4.5	5.4	0	
	NAF	18.8	16.4	19	18.4	4.2		
Sexual assault by a stranger	S	34.1	33.3	.11 (3)	36.1	23.1	16.7	7.93 (6)
,	VB	21.4	22.2		23.5	20.5	16.7	
	R	12.7	11.1		13.4	7.7	16.7	
	NAF	31.7	33.3	26.9	48.7	50		
Sexual assault by a relative or a close person	S	45.2	42.2	6.6 (3)	42.5	48	40	1.4 (6)
	VB	31.9	20		29.5	30	40	
	R	6	4.4		6.2	6	0	
	NAF	16.9	33.3	21.9	16	20		
Severe, chronic or disabling disease	S	50.8	43.4	13.4 (3)**	46.8	46.2	66.7	8.73 (6)
, e	VB	31.9	27.7	~ /	31.8	26.7	20.8	~ /
	R	8.2	15.1		11	13.3	0	
	NAF	9.1	13.8	10.4	13.8	12.5		
Divorce or separation	S	31.6	29.2	3.8 (3)	29	30.4	31.6	6.57 (6)
<u>1</u>	VB	31.8	28.8		31.2	30.4	23.7	
	R	4.9	4.8		4.5	5.1	13.2	
	NAF	31.6	37.2	35.3	34.2	31.6		
Migration for economic reasons	S	22.6	15.2	5.4 (3)	16.1	24.5	19	4.22 (6)
0	VB	32.7	32.7		35.1	28.6	33.3	(*)
	R	1.5	3.6		2.5	3.1	4.8	
	NAF	43.2	48.4	46.2	43.9	42.3		

*Note.* S = survivor; VB = vulnerable; R = resistant; NAF = nonaffected; SPR = self-perceived resistance. \* p < .05. \*\* p < .01. \*\*\* p < .001.

sense of security and bonding (Barazzone et al., 2018); predictability and sense of control over one's life (Frazier, 2003) among others.

On the other hand, severe chronic and disabling illness has a different impact as it uniquely confronts the person with death and eventually, the meaning of life (Park, 2010). This is especially relevant as previous studies have suggested a low correlation of Life-Threatening diseases with PTSD (Breslau et al., 2004). Our results emphasize the importance of systematically including also a perspective based on measuring the impact on worldviews besides standard clinical diagnosis. Our data also confirm that sexual violence is a traumatic event with the highest personal impact, especially by a friend or relative. However, it adds a new perspective: domestic violence and divorce can have very similar severity of impacts in terms of vulnerability and resistance. Although the number of women who report it is much higher, the impact on worldviews is observed for both men and women. Other forms of gender-based violence and abuse should also be included in future studies on sexual abuse (Scott et al., 2018).

The perception of life impact (PI) is a constant powerful predictor for all the experiences, with the only exception of migration. By contrast, the actual Perception of Life threat (PT) is not relevant for most extreme experiences, either being expelled from the model or having a marginal contribution to the overall explained variance. This includes those events where security is central, like motor vehicle accidents or natural catastrophes. Interestingly, Life Threat is a predictor of PTSD in experiences of crisis: domestic violence, divorce, severe, chronic, or disabling illness, and migration. Our results support previous findings (Frese et al., 2004; Johansen et al., 2006; Ullman et al., 2007) showing that in order to understand the harm caused by extreme experiences, in general, it is not enough to consider the perception of life threat (Boals et al., 2015). Our data are also congruent with previous studies on rape and sexual abuse, indicating that it is the perception of impact but not the perception of life threat which predicts posttraumatic symptoms and remission (Müller et al., 2018).

Our results do not support the idea that the accumulative impact of traumas as measured by the ASTE will always predict PTSDrelated symptoms. This is only so for motor vehicle accidents,

Table 4	
ANOVA of Self-Perceived Resistance by Posttraumatic Stress Disorder Scores	

Experience	SPR	PCL-C mean	F	Differences
Road traffic accident	S VB R NAF	49.07 48.65 41.23 43.15	8.4***	S=VBS > R & S>NAFVB>R & VB>NAFR=NAF
Natural disaster	S VB R NAF	49.57 49.92 42.22 38.44	7.2***	S=VBS = R & S>NAFVB=R & VB>NAFR=NAF
Death, assault or beating threats	S VB R NAF	52.65 49.15 42.18 40.18	28.9***	S=VBS > R & S>NAFVB>R & VB>NAFR=NAF
Domestic Violence	S VB R NAF	54.08 49.04 42.06 42.55	10.7***	S>VBS > R & S>NAFVB=R & VB>NAFR=NAF
Sexual assault by a stranger	S VB R NAF	53.33 50.45 49.33 46.53	1.4	S=VBS = R & S=NAFVB=R & VB=NAFR=NAF
Sexual assault by a relative or a close person	S VB R NAF	52.91 52.14 43.63 44.77	2.6	S=VBS = R & S=NAFVB=R & VB=NAFR=NAF
Serious, chronic or disabling disease	S VB R NAF	51.08 44.84 41.43 42.69	9.53***	S>VBS > R & S>NAFVB=R & VB=NAFR=NAF
Divorce or separation	S VB R NAF	52.44 44.02 43.72 40.36	26.809***	S>VBS > R & S>NAFVB=R & VB=NAFR=NAF
Migration for economic reasons	S VB R NAF	52.02 44.78 32 43.72	3.945**	S=VBS = R & S>NAFVB=R & VB=NAFR=NAF

Note. S = survivor; VB = vulnerable; R = resistant; NAF = nonaffected; PRI = Perceiver Resistance Indicator.

\* p < .05. \*\* p < .01. \*\*\* p < .001.

natural disasters, severe, chronic, or disabling disease, and divorce. For all other experiences of trauma and crisis, including sexual abuse, our combined indicator of the number of traumatic events and the impact of each of them does not significantly contribute to predicting PTSD. Although according to literature (Shalev et al., 2019); (Frissa et al., 2013) living more than one extreme experience is related to the onset of PTSD-related symptoms, our study shows that having experienced multiples different traumas does not necessarily predict the severity and type of response to trauma in the present. This nonlinear relationship might help explain contradictory results in the literature.

Self-perceived resistance does not change with age, but it is related to gender and educational level. Those considered as Nonaffected are mostly men and with a high educational level. Those identified as Survivors or Vulnerable are mostly women and people with a low educational level. Previous reports indicate a relationship between clinical impact with gender and low educational level (Shalev et al., 2019). Our results enlarge the perspective suggesting a similar pattern concerning resilient and vulnerable answers.

The percentage of resilient versus vulnerable people change across different trauma and crisis experiences. Across all experiences of trauma and loss, the correlation between a real threat and subjective impact is moderate. Around 27% of people declare a severe subjective impact, although reporting that the actual threat was low. This combination might act as a sentinel indicator of the population eventually most in need of support (not necessarily clinical) after the experience. Similarly, 16% perceive themselves as mostly unaffected as compared to the actual high severity of the threat. In between, there are the categories in which threat and subjective impact are more or less proportional. Our data confirm the importance of narratives to understand the impact of trauma and crisis, going beyond PTSD circumscribed models (Boals et al., 2015). Sexual assault seems a distinct category where the clinical impact is high irrespective of the perception of vulnerability or resistance. Again, the idea that despite having posttraumatic symptoms as much severe as other victims, some persons built a narrative of resistance by probably normalizing those symptoms and assuming them as part of the healing process. Finally, there is a controversy on whether certain crisis events (like cancer, divorce, or migration) should be considered traumatic events. Our results show that this is only the case when they are associated with an actual perception of life-threat. It is not the crisis itself, but the threat what makes them traumatic.

We propose the Perceived Resistance Indicator as a simple measure to study the intersection between the threatening characteristics of the experience and the subjective experience of the survivor.

Furthermore, this perspective allows a new way of understanding preventive action and resource planning. The classic approach focuses on early detection of most affected cases. However, these are often populations that will not seek help nor attend services, as they do not have a demand. The Perceived Resistance Indicator can help to analyze profiles of demand better and improve service planning. It can also help in profiling the impact of different live events beyond the classical distinction between interpersonal and noninterpersonal experiences.

#### Limitations

This study presents certain limitations due to the use of selfreports and retrospective methodology in the study of trauma. Furthermore, the use of a self-selected Internet sample could have caused a of self-selection effect that would explain the high prevalence of some of the traumatic events evaluated by the ASTE. However, the correlational nature of the study allows us to use these data, since our objectives are related to subjective perceptions of impact and threat and their relationship with posttraumatic symptoms regardless of its population prevalence.

For future research, it would be very interesting to add other types of experiences, related to losses such as grief, other experiences of threats such as discrimination, as well as other crisis experiences different from those collected in this study.

#### Conclusion

Although the perception of physical threat and the perception of life impact are both relevant in the prediction of the appearance of posttraumatic-related symptoms, the second one, linked to the worldviews and narrative built upon time, is what best explains symptomatology. Interpersonal and chronic experiences that imply a change in expectations for the future and challenge the understanding of oneself or others have a more profound impact as compared to experiences that mainly question security and predictability. Self-perceived resilience changes across types of events of trauma and crisis, providing epidemiological support to the ecological and interactive nature of the human response to trauma and useful insights into the narratives of resistance or vulnerability associated with extreme experiences. It can also potentially provide a new outlook in the planning of services.

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